

**Amendments to the Claims:**

This listing of claims will replace all prior versions, and listings, of claims in the application:

**Listing of Claims:**

1           1.       (Previously Presented) A method of manufacturing an integrated circuit having  
2       trench isolation regions in a substrate including germanium, the method comprising:

3                   providing a substrate comprising a silicon-germanium layer and a strained silicon  
4       layer provided above the silicon-germanium layer;

5                   forming a mask layer above the substrate;

6                   selectively etching the mask layer to form apertures associated with locations of  
7       the trench isolation regions;

8                   forming trenches in the substrate at the locations, the trenches having sidewalls;

9                   providing a semiconductor or metal layer by selective epitaxial growth directly in  
10       contact with the sidewalls such that the semiconductor or metal layer is in direct contact with the  
11       silicon-germanium layer and the strained silicon layer; and

12                   converting the semiconductor or metal layer in the trenches of the substrate into  
13       oxide liners.

1           2.       (Original) The method of claim 1, further comprising providing an insulative  
2       material in the trenches to form the trench isolation regions.

1           3.       (Original) The method of claim 2, further comprising removing the insulative  
2       material until the mask layer is reached.

1           4.       (Original) The method of claim 1, further comprising:

2                   providing a low temperature process oxide layer above the substrate and an  
3       amorphous capping layer above the oxide layer.

1           5.       (Withdrawn) The method of claim 1, wherein the amorphous capping layer is  
2       amorphous silicon.

1           6.       (Original) The method of claim 1, wherein the semiconductor or metal layer  
2       includes silicon material.

1           7.       (Original) The method of claim 1, further comprising:  
2                   providing a silicon nitride layer above the substrate and providing an amorphous  
3       capping layer above the silicon nitride layer.

1           8.       (Original) The method of claim 1, wherein the forming oxide liners step is an  
2       oxidation process.

1           9.       (Previously Presented) A method of forming shallow trench isolation regions in a  
2       strained semiconductor layer, the method comprising:

3                   providing a hard mask layer above the strained semiconductor layer;

4                   providing a photoresist layer above the hard mask layer;

5                   selectively removing portions of the photoresist layer at locations in a  
6       photolithographic process;

7                   removing the hard mask layer at the locations;

8                   forming trenches in the strained semiconductor layer under the locations;

9                   providing a conformal semiconductor layer in the trenches in direct contact with  
10      the strained semiconductor layer by selective epitaxial growth; and

11                  oxidizing the conformal semiconductor layer to form a liner in the trenches.

1           10.      (Original) The method of claim 9, further comprising:

2                   providing a pad oxide layer above a strained silicon layer before the providing a  
3       hard mask layer step.

1           11.   (Original) The method of claim 10 further comprising:

2                   removing the pad oxide layer at the locations before the forming trenches step.

1           12.   (Currently Amended) The method of claim 9, further comprising:

2                   providing an insulative material in the trenches to form the shallow trench  
3 isolation regions; and

4                   removing the hard mask layer ~~in a wet bath~~.

1           13.   (Withdrawn) The method of claim 9, further comprising:

2                   providing a germanium-containing layer above the strained semiconductor layer.

1           14.   (Withdrawn) The method of claim 13, wherein the strained semiconductor layer

2 is at least 200 Å thick.

1           15.   (Withdrawn) The method of claim 14, wherein the germanium-containing cap

2 layer is 100 Å – 400 Å.

1           16.   (Withdrawn) The method of claim 15, wherein the oxide liner is silicon dioxide

2 grown in an oxygen atmosphere.

1           17.   (Previously Presented) A method of forming a liner in a trench comprising:

2                   providing a strained layer above a germanium containing layer;

3                   selectively etching the germanium containing layer and the strained layer to form  
4 the trench;

5                   providing a semiconductor layer in the trench by selective epitaxial growth such  
6 that the semiconductor layer is in direct contact with the germanium containing layer and the  
7 strained layer; and

8                   converting the semiconductor layer into an oxide liner such that substantially all  
9 of the semiconductor layer is consumed during the conversion.

1           18.   (Currently Amended) The method of claim 17, wherein the epitaxial growth is  
2 performed at a temperature below ~~600~~ 600°C.

1           19.   (Cancelled)

1           20.   (Original) The method of claim 19, wherein the oxide liner is 100-200 Å thick.